

Abstract

The invention relates to a process for preparing hydrogenated or partially hydrogenated, racemic
ansa-metallocene complexes by reacting bridged or unbridged transition metal complexes with
5 alkali metal compounds or alkaline earth metal compounds, heating the resulting reaction mixture
to a temperature in the range from -78 to 250°C and at least partially hydrogenating the reaction
products in the presence of a suitable catalyst, to the corresponding hydrogenated or partially
hydrogenated metallocenes and to their use as catalysts or as a constituent of catalysts for the
polymerization of olefinically unsaturated compounds or as reagents or catalysts in stereoselecti-
10 ve synthesis.

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